Draft Provisions for Authorization of Core Actions for CALFED Bay-Delta Program

		Estimated Costs ($1,000)
(1.)	**PROTECT AND ENHANCE EXISTING BAY-DELTA HABITAT** - Develop and implement a program to protect and enhance existing valuable habitat in the Bay-Delta. Such a program shall include, but is not limited to, management, partnerships, acquisition of fee title or conservation easements from willing sellers, and regulatory actions to minimize continued habitat loss of existing: • **shallow areas** adjacent to levees from filling, and from dredging and boat operation, • **channel islands** from erosion-causing processes such as boat wakes and channel dredging, • **tidal and nontidal riparian habitats** from development or other land use practices, • **wetlands** from development or other land use practices, and • **upland habitat** from development or other land use practices.	$34,000 capital $2,540 annual
(2.)	**IMPROVE RIPARIAN HABITATS** - Develop and implement a program to improve riparian habitat that has been degraded in the Delta and in the upstream river system. Such a program shall include expansion of riparian areas through revegitation activities. Delta riparian habitats for improvement shall include tidal areas and within-island sites. Improvements in the river system shall include the Sacramento River corridor and its tributaries; the San Joaquin River corridor and its three major tributaries: the Merced Stanislaus, and Tuolumne Rivers; and Delta tributaries such as the Mokelumne and Cosumnes Rivers.	$57,800 capital $650 annual
(3.)	**EXPAND WETLANDS ACQUISITION PROGRAMS** - Expand funding for existing wetlands programs to purchase of fee title or conservation easements from willing sellers to preserve high priority wetlands in perpetuity. The acquisition shall focus on enlarging important areas of existing freshwater and brackish water wetlands and riparian habitats to incorporate currently protected areas into larger connected corridors.	$12,800 capital $250 annual

(4.) **MODIFY LEVEE PROTECTION PRACTICES** - Develop and implement a program and provide incentives to change levee protection and maintenance practices to improve fish and wildlife habitat values within the Delta. Such a program shall include, but is not limited to, willing partnerships and funding for local reclamation districts to:

$0 capital

$5,600 annual

- **restore shoreline and shallow-water edges** of channels, such as construction of riverside berms at selected sites, during levee protection and channel maintenance work, and
- **retain riparian vegetation** by implementing alternative levee maintenance practices.

(5.) **MODIFY AGRICULTURAL PRACTICES** - Provide incentives to encourage Delta farmers to adopt agricultural practices that improve habitat values while maintaining agricultural productivity. These incentives shall include, but not limited to:

$0 capital

$5,300 annual

- cooperate with California Department of Fish and Game (DFG) and provide funding for outreach programs and dissemination of literature, such as the DFG manual describing **wildlife-friendly agricultural practices that provide wildlife habitat while maintaining agricultural productivity**, and
- establish cooperative partnerships with willing landowners to **retain crop types and cropping practices that provide valuable wildlife habitat**

(6.) **IMPROVE CONTROL OF INTRODUCED SPECIES** - Coordinate with the State of California to improve management and control of non-native species that could become introduced to the Bay-Delta ecosystem. Such measures shall be coordinated with efforts to protect and enhance the natural ecosystem values of the Delta. The control measures shall include, but not limited to:

$0 capital

$1,750 annual

- promoting and coordinating California interest in applying existing federal law for regulating **ballast-water releases** to California ports,
- funding additional staffing and more **rigorous vehicle inspections at California border stations**, and

- coordinate **monitoring for early detection** of new introductions of invasive aquatic and terrestrial species and promote, coordinate, and fund a **rapid response program** to eradicate detected populations before they have an opportunity to spread.

(7.) **INCENTIVES FOR WATERSHED MANAGEMENT** - Develop and implement a program to provide incentives and undertake cooperative partnerships with landowners and local agencies to improve watershed management in the Sacramento and San Joaquin River basins and tributaries. The program shall implement a variety of measures to:

$2,500 capital

$2,050 annual

- **manage land uses** to protect water quality and enhance water yield,
- **manage riparian zones** to protect water quality, and
- **reduce erosion rates.**

(8.) **PROVIDE FUNDING FOR CVPIA PROVISIONS** - Coordinate with the Secretary of Interior and fund the State of California cost-share portions of selected provisions of the Central Valley Project Improvement Act (CVPIA), Public Law 102-5__, October 31, 1992. Funding shall be provided for the State cost-share of the following CVPIA provisions:

$43,550 capital

$750 annual

- 3406(b)(5) - mitigate for fishery impacts from operations of **Contra Costa Canal Pumping Plant No. 1,**
- 3406(b)(6) - **Shasta Dam temperature control devise,**
- 3406(b)(10) - minimize fish passage problems at **Red Bluff Diversion Dam,**
- 3406(b)(13) - restore and replenish **spawning gravel,**
- 3406(B)(16) - establish a comprehensive assessment program to **monitor fish and wildlife,**
- 3406(b)(17) - resolve fishery passage problems at the **Anderson-Cottonwood Irrigation District Diversion Dam,** and
- 3406(b)(21) - avoid losses of fish resulting from **unscreened or inadequately screened diversions.**

In addition to funding for the above Shasta Dam temperature control devise, evaluate the need for a similar device at Whiskeytown Dam, releasing sufficient flows from Whiskeytown and Shasta to maintain adequate temperatures in the upper Sacramento River without significantly affecting water supply, and a temperature management control plan for return flows from the Colusa Drain and Sutter Slough.

(9.) **OTHER FISHERIES MANAGEMENT** - Develop and implement a program to: $200 capital

- improve **recruitment of natural spawning gravels** in the Sacramento and San Joaquin River basins and tributaries, $5,004 annual
- **modify natural barriers** where they are most restrictive to anadromous fish passage and migration,
- use **real-time monitoring and adaptive management** to reduce losses of fish to south-Delta pumping plants; (*real time monitoring focuses on the distribution patterns of important anadromous and resident fish relative to their vulnerability of being drawn into the pumps; adaptive management refers to the process under which adjustments are made in operations of the State Water Project and CVP to minimize effects on key fish based on the available real-time monitoring information),*
- **modify hatchery operations** to reduce effects on wild fish populations, and
- coordinate with the Pacific Managment Council and the Department of Fish and Game to **improve data collection** and analysis needed to regulate fish harvest.

(10.) **INCENTIVES FOR WATER CONSERVATION** - Develop and implement a program to establish incentives and education for increased conservation practices. Such a program shall include incentives, but is not limited to, loans, cost-sharing for voluntary implementation, and evaluations in cooperation with water districts to determine changes to pricing structures that would further encourage conservation. These include: $0 capital $2,350 annual

- incentives for broader application of agricultural **Efficient Water Management Practices,**
- incentives for improved use of conservation **Best Management Practices ,**

- funding educational outreach programs and providing **technical and planning support** to water districts requesting that support

(11.) **INCENTIVES FOR CONJUNCTIVE USE** - Develop and implement a program to establish incentives for conjunctive use and promote easing of institutional barriers to conjunctive use. Such a program shall include, but not limited to:

$5,000 capital

$2,500 annual

- **prepare studies** and information on capacities of groundwater basins, hydrological linkages between surface water features and underlying basins, and other data governing cost effectiveness,
- **financial incentives** including cost-sharing for studies of conjunctive use feasibility and low-interest loan programs to fund capital improvements to conjunctive use operations, and
- assist water districts in resolving issues of legal protection and other **institutional barriers** that currently complicate implementation of conjunctive use programs.

(12.) **FACILITATE WATER TRANSFERS** - Develop and implement a program to better coordinate and facilitate water transfers. Such a program shall:

$2,500 capital

$1,600 annual

- **coordinate statutory and regulatory responsibilities** for water transfers to improve the review and approval process of proposed transfers while continuing to maintain protections for the ecosystem,
- **improve planning and coordination** procedures such as consolidating anticipated transfers to effectively address cumulative impacts,
- **improve operational procedures** by coordination among operators of facilities to achieve more efficient use of physical capacities,
- establish a **permanent water transfer brokering** mechanism or institution to link potential sellers and buyers of water,
- remove impediments to transfers by establishing mechanisms for **market-based water transfers**, and
- promote and fund development of **long-term drought contingency planning** by local water agencies, and develop such plans at state and federal level.

(13.) **INCENTIVES FOR AGRICULTURAL WATER QUALITY MANAGEMENT** - Provide incentives for reduction of agricultural pollutant discharges into waterways. These incentives shall include:

$17,600 capital

$1,000 annual

- **land retirement,** by compensated purchase from willing sellers, marginally productive agricultural lands that have drainage problems, and
- financial incentives and cooperative partnerships with willing landowners to assist them in adopting and implementing **pollution source control** measures such as delaying timing of drainage discharges, modifying field drainage systems to reduce drainage volumes, managing irrigation tailwater to reduce pesticide residues, and adopting BMP's to reduce rainfall induced discharge of pesticides into water courses.

(14.) **IMPROVEMENTS TO SYSTEM RELIABILITY** - Develop and implement a Delta Long-Term Levee Protection Plan to address the highest areas of concern for existing Delta levees. This shall identify the plan to monitor, evaluate, maintain, plan for emergency management, and stabilize existing levees and identify financing plans. Specific elements of the plan shall include:

$0 capital

$19,190 annual

- **Subventions Program** element for long-term levee maintenance and improvements,
- **Special Projects** element for stability work on highest priority sites within the Delta,
- **subsidence reduction program** consisting of cooperative partnerships with landowners to voluntarily cease agricultural practices on peat soils near levees,
- coordinating a pilot program to evaluate techniques for beneficial **reuse of dredged materials,**
- establishment of an **Emergency Levee Management Plan** to delineate responsibilities of agencies in responding to levee failures,
- investigate the feasibility of an **insurance fund** in coordination with the Office of Emergency Services and/or FEMA to recover flooded islands, and
- establishment of **habitat corridors as mitigation** for impacts from maintenance and stabilization of existing levees.

Total Estimated Capital Cost ($1,000)	**$175,950**
Total Estiamted Annual Cost ($1,000)	**$50,534**